

Site:	Syntex-Verona
ID #:	MD007452154
Break:	1,3
Other:	C-29C 4-30-84

0751 gr



PRIORITY POLLUTANT AND  
DIOXIN DATA FOR

The Syntex Area  
Verona, Missouri  
(Map Separate)

TDD #R-07-8404-18

April 30, 1984

Prepared by: Sharon P. Martin

107/ 7056923



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## MEMORANDUM

Attached are 6 blackline copies of the requested mylar original representing the original dioxin sampling (and EPA splits) of the Syntex Plant and adjoining property in Verona, Missouri. The original and the mylar copy have been delivered to Dan Harris by Western Blue Print. Also shown on the map are locations of proposed additional sampling. Dioxin data is reported in parts per billion (ppb). Samples already collected are shown with closed symbols. Proposed sampling is shown by open symbols on this map. Both Syntex's and EPA's values are shown on the map. The Syntex dioxin values have been corrected for water content as shown on the attachments of their data (Attachment J, M, N, and O). The EPA dioxin data has gone through quality assurance as shown on the attached Dioxin work report dated 4/10/84. Included also is a copy of the boring logs submitted by Syntex to the EPA.

The locations of samples for which priority pollutant data is available (See Attached Tables) are also shown on this map. Where there were less than 4 compounds detected in the sample the number of such compounds is shown on the map. No qualifiers are given, however, as to the concentration or identity of those compounds. It should be noted that in two samples only methylene chloride was detected. Methylene chloride is used in the preparation of sample bottles and is thus a possible contaminant from the sampling process. A general legend is included for the tables of priority pollutant data.

Proposed sample locations from Syntex's work plan, dated 2/20/84, are shown on the attached map with the following exceptions:

- a) In the Lagoon area, the subquadrant (30 foot squares) with the lowest surface gradient in quadrants 191 and 193 will be sampled by the trench method to a depth of six feet or to the groundwater level.

.. .

- b) In the Lagoon and Burn Areas, Syntex has proposed possible additional sampling around the perimeters of these areas;
- c) Wipe samples of the production equipment;
- d) Proposed groundwater monitoring wells;
- e) Fish and sediment samples in the Spring River.

The data for plotting of the above listed samples was not provided to FIT. The locations of wells already sampled in the Verona area are not included in this report as most of the wells are outside the area of the attached map.

Scott Ritchey, ARHM, reports that the samples collected in the Trench Area were actually a mixture of sediment and water and that they were analyzed by EPA in this mixed form. With one exception, all the water samples from this area contained less dioxin than the level of the detection limit (See Table 2 of the attached tables). The water sample at location T-5 is reported to contain 41.0 ppb dioxin. This value is seemingly high, particularly when considering the Syntex reported value of 40.0 ppb dioxin for soil from this same location.

The property line samples shown on the adjoining property on the attached map may represent more samples than intended by Syntex. The description of these samples in Section H, Part IV of Syntex's Sample Plan is unclear as to the extent of such sampling.

The mylar original has been sprayed with a workable fixatif rather than a permanent spray so that changes can be made easier. Eighty hours have been used to complete this task.

We are sending Scott Ritchey, ARHM, two blackline copies of this map and a bound copy of the accompanying text.

SM/drh

Attachments: - Tables 1-4 of Dioxin Results  
- Diowork Report Dated 4/10/84  
- Attachments J, M, N, and O of Syntex's Dioxin Data  
- 42 Tables of Priority Pollutant Data  
- Boring Logs For Syntex's Sampling of August - September, 1982.

TABLE 1

BURN AREA DIOXIN RESULTS  
SAMPLES COLLECTED SEPTEMBER, 1982

Map Designation	EPA #	Syntex Designations	Syntex Data (ppb)	EPA Data (ppb)
● A	AN3831	B1,B2	179	0.19
● B	AN3832	B3,B4	180	24.
● C	AN3833	B5,B6	181	1.3
● D	AN3834	B7,B8	182	6.2
◆ E	AN38I	B1-8	---	3.2

\*I = Invalidated

TABLE 2

TRENCH AREA DIOXIN RESULTS  
SAMPLES COLLECTED SEPTEMBER, 1982

Map Designation	EPA #	Syntex Designation	Syntex Data (ppb)	EPA Data (ppb)	Total Depth (feet)
T1	AT4501	150	0.13	1.0 (U)	6.0
T2	AT4502	151	0.13	---	8.0
T3	AT4503	152	0.21	---	9.0
T4	AT4504	153	0.19	0.58 (U)	6.0
T5	AT4505	154	40.	---	9.0
T6	AT4506	155	3.9	---	10.0
T7	AT4507	156	0.34	---	6.0
T8	AT4508	157	0.90	1.0 (U)	13.0
T9	AT4509	158	16.	I	12.0
T10	AT4510	159	0.32	---	6.0
T11	AT4511	160	0.52	---	4.5
T12	AT4512	161	19.	---	4.5
T13	AT4520	162	3.3	---	9.0
T14	AT4519	163	69.	---	10.5
T15	AT4518	164	3.0	0.25 (U)	12.0
T16	AT4517	165	0.16	---	13.0
T17	AT4516	166	52.	4.5 (J)	10.5
T18	AT4515	167	0.033	---	13.0
T19	AT4514	168	0.21	---	12.0
T20	AT4513	169	0.12	---	6.5
P1	AT4532	199	0.43	---	15.0
P2	AT4533	200	0.45	---	15.0
P3	AT4534	201	0.041	---	15.5
P4	AT4535	202	ND	---	7.0
P5	AT4536	203	ND	---	15.0
P6	AT4537	204	0.023	---	15.0
P7	AT4538	205	ND	---	12.5
P8	AT4539	206	0.075	---	15.0
P9	AT4540	207	18.	---	15.0
P10	AT4541	147	.14	0.25 (U)	15.5
P11	AT4542	148	.007	0.25 (U)	15.0
P12	AT4543	149	.013	---	15.0
T1	AT4521	150	---	0.25 (U)	Water
T2	AT4522	151	---	0.25 (U)	"
T3	AT4523	152	---	I	"
T4	AT4524	153	---	I	"
T5	AT4525	154	---	41.0	"
T6	AT4526	155	---	0.25 (U)	"
T7	AT4527	156	---	0.25 (U)	"
T8	AT4528	157	---	0.25 (U)	"
T9	AT4529	158	---	0.25 (U)	"

(TABLE 2 -- Continued)

TRENCH AREA DIOXIN RESULTS  
SAMPLES COLLECTED SEPTEMBER, 1982

Map Designation	EPA #	Syntex Designation	Syntex Data (ppb)	EPA Data (ppb)	Total Depth (feet)
T16	AT4546	165	---	0.25 (U)	Water
T17	AT4530	166	---	0.25 (U)	"
A	AT45A	P1-7	---	0.25 (U)	Composite
B	AT45B	P8-12	---	0.51 (U)	"
C	AT45C	T13-16	---	1.33	"
D	AT45D	T17-20	---	0.50 (U)	"
E	AT45E	T5-8	---	3.0 (J)	"
F	AT45F	T10-12	---	1.5	"
G	AT45G	T1-3	---	0.10 (U)	"

(U) = Less Than The Detection Limit

I = Invalidated

(J) = Approximate Value

ND = Not Detected

**TABLE 3**  
**IRRIGATED AREA DIOXIN RESULTS**  
**SAMPLES COLLECTED SEPTEMBER, 1982**

Map Designation	EPA #	Syntex Designations	Syntex Data (ppb)	EPA Data (ppb)
■ A	AN3813	IA 1-8	1001	29.0
■ B	AN3814	IA 9-16	1002	0.44
■ C	AN3815	IA 17-24	1003	0.17
■ D	AN3816	IA 25-32	1004	0.27
■ E	AN3817	IA 34-40	1005	0.14
■ F	AN3838	IA 41-48	1006	0.23
◆ G	AN38H	IA 1-24, 33-48	---	3.4

(U) = Less Than The Detection Limit

**TABLE 4**  
**LAGOON AREA DIOXIN RESULTS**  
**SAMPLES COLLECTED SEPTEMBER, 1982**

Map Designation	EPA #	Syntex Designations	Syntex Data (ppb)	EPA Data (ppb)
▲ A	AN3818	L1, L2	183	0.44
● B	AN3819	L6	---	---
▲ C	AN3844	L3, L4	184	7.2
▲ D	AN3820	L5, L6	185	7.8
▲ E	AN3821	L7, L8	186	2.8
● F	AN3822	L8	---	0.70 (U)
▲ G	AN3823	L9, L10	187	2.1
▲ H	AN3824	L11, L12	188	9.0
▲ I	AN3826	L13, L14	189	13.
▲ J	AN3827	L15, L16	190	1.6
▲ K	AN3828	L17, L18	191	110.
▲ L	AN3829	L19, L20	192	26.
▲ M	AN3830	L21, L22	193	340.
▲ N	AN3840	L23, L24	194	0.41
▲ O	---	L25, L26	195	0.29
● P	AN3835	L28	---	0.25 (U)
▲ Q	AN3836	L27, L28	197	1.2
▲ R	AN3841	L29, L30	198	2.3
● S	AN3842	L28, L29	---	0.25 (U)
● T	AN38J	L8, 13, 26	---	0.25 (U)
◆ U	AN38K	L12, 7-14	---	2.4
◆ V	AN38L	L15-24	---	60.2
◆ W	AN38M	L25-30	---	0.80 (U)

I = Invalidated

(U) = Less Than The Detection Limit

PAGE 1

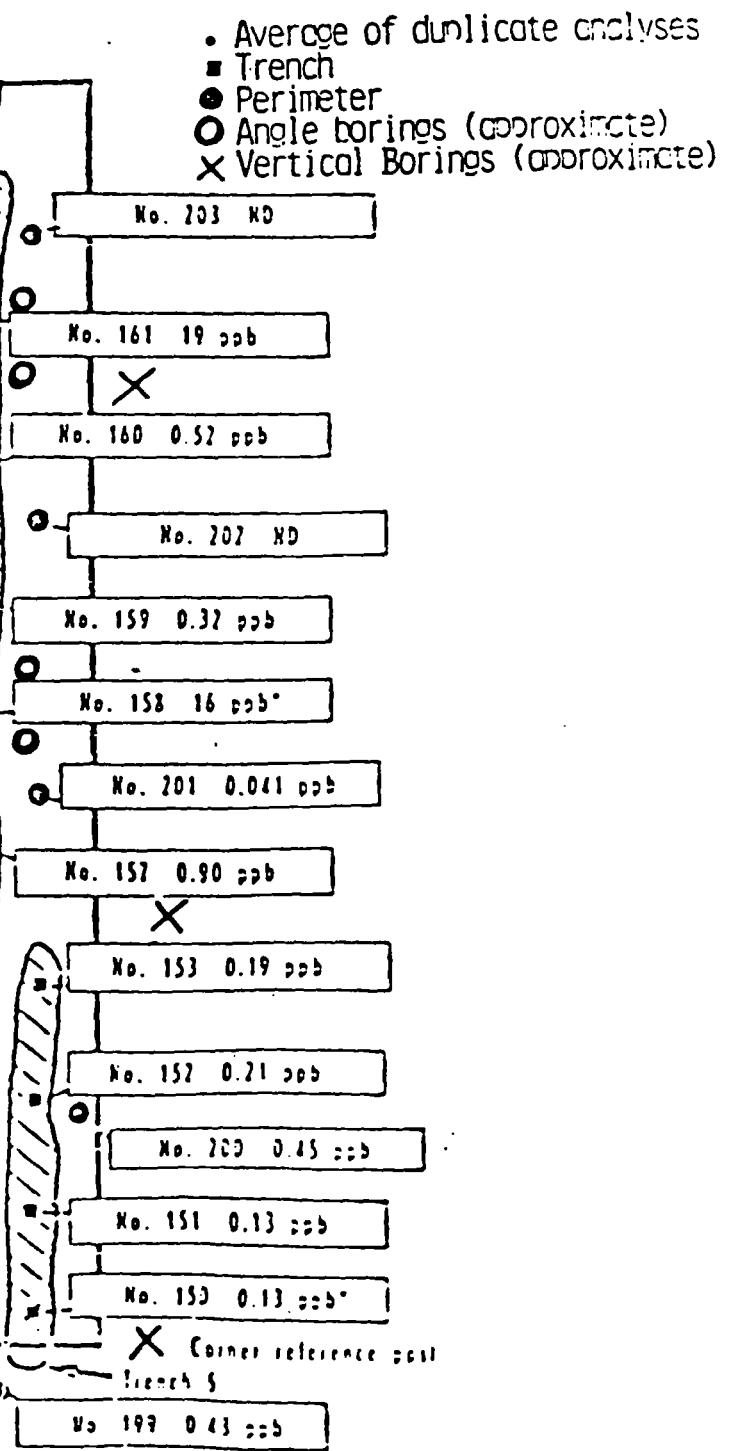
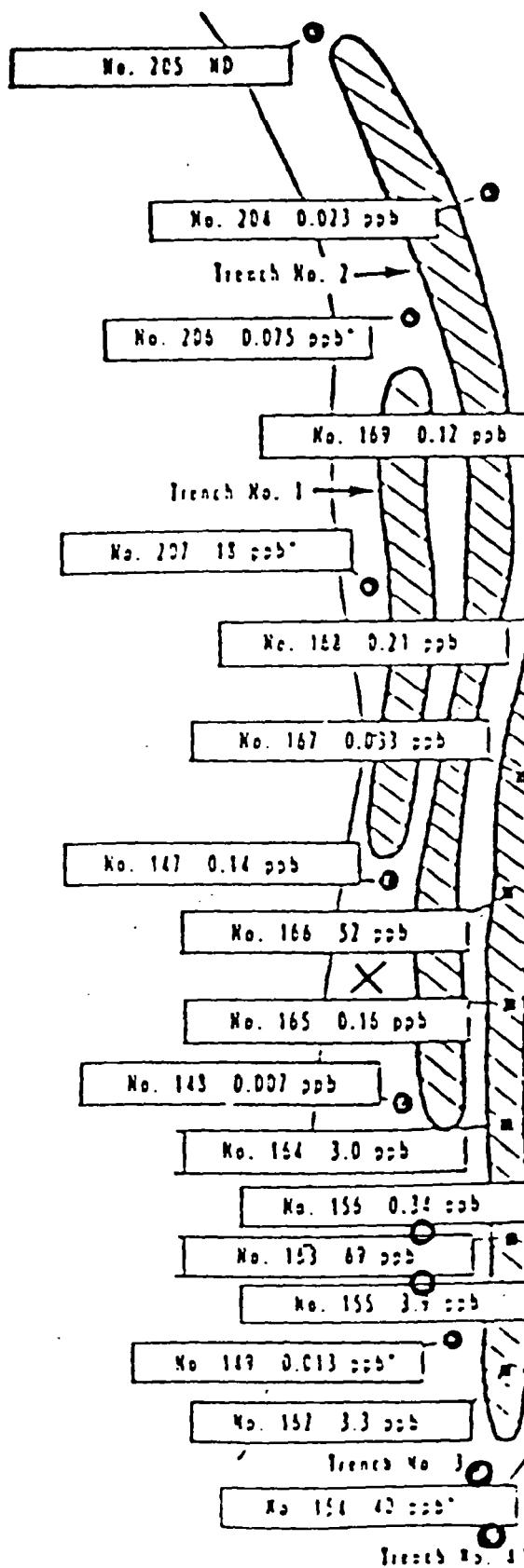
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DATA BASE - SYNTEX

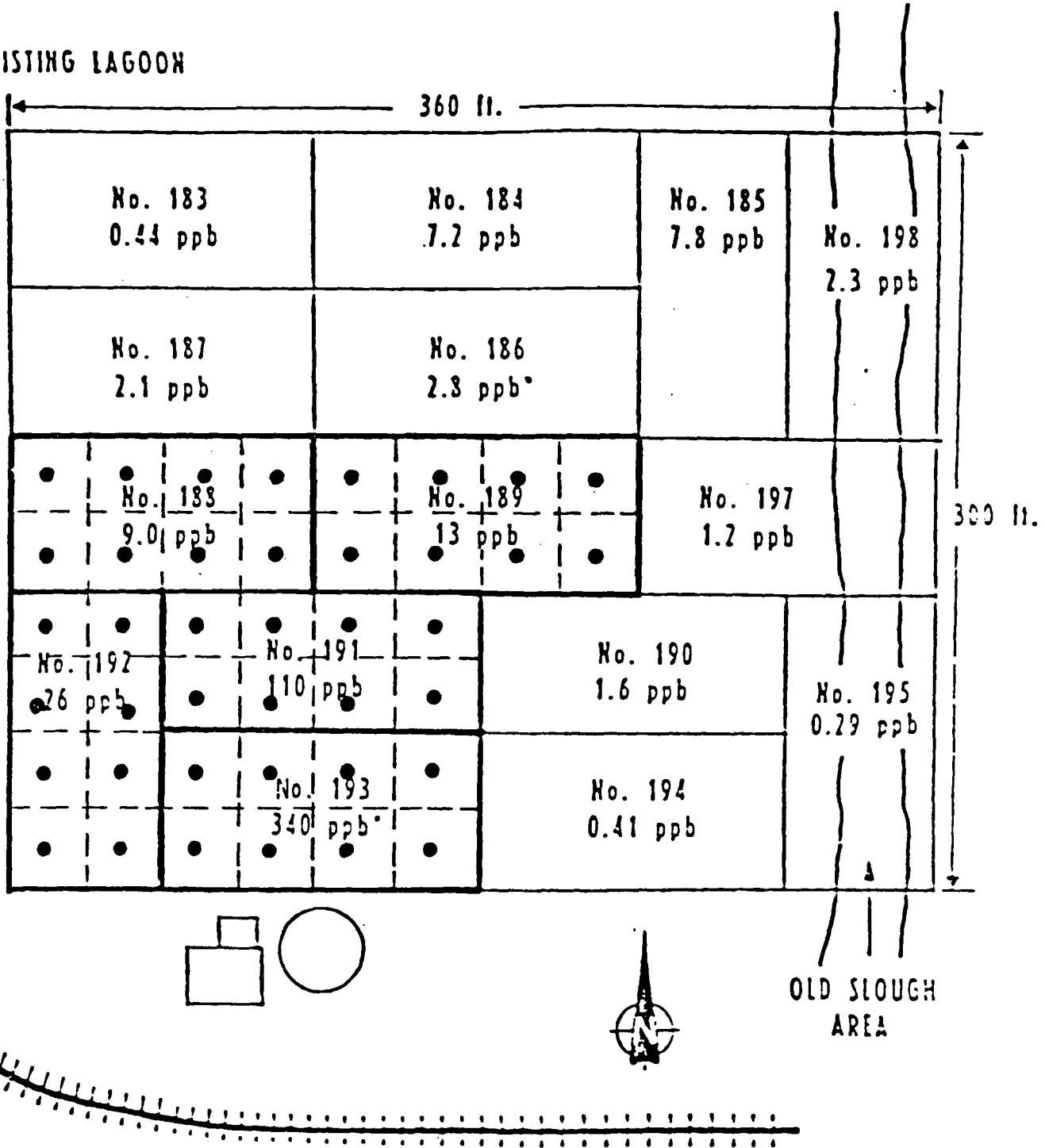
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SITE	EPA NO	VALUE	SAMPLE#	DESCRIPTION
SYN	AN3816	.260	U	V 09/15/82 DISCRETE SOIL SAMPLE FROM IRRIGATION AREA COLLECTED BY SYNTEX (A 25-32)
SYN	AN3819	.000	I	V 09/15/82 DISCRETE WATER SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L-6)
SYN	AN3820	3.800	V	V 09/15/82 DISCRETE SOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L-7-L-6)
SYN	AN3821	1.600	V	V 09/15/82 DISCRETE SOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L-7)
SYN	AN3822	.700	V	V 09/15/82 DISCRETE WATER SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L-5)
SYN	AN3833	.000	I	V 09/15/82 DISCRETE SOIL SAMPLE FROM BURN AREA COLLECTED BY SYNTEX (B 5, B 6)
SYN	AN3845	.250	U	V 09/15/82 DISCRETE WATER SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L 28)
SYN	AN3841	1.100	V	V 09/15/82 DISCRETE SOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L 29,30)
SYN	AN3842	.250	U	V 09/15/82 DISCRETE WATER SAMPLE FROM LAGOON COLLECTED BY SYNTEX (L 28,29)
SYN	AN3844	3.400	V	V 09/15/82 COMPSOIL SMPLE FROM IRRIGATI,AREA COLLECTED BY SYNTEX, AN3813-15,17,18 (A 1-24,33-48)
SYN	AN3841	3.200	V	V 09/15/82 COMPOSITE SOIL SAMPLE FROM BURN AREA COLLECTED BY SYNTEX, AN3831-34 (B 1-8)
SYN	AN3853	.250	U	V 09/15/82 COMPOSITE WATER SAMPLE FROM LAGOON COLLECTED BY SYNTEX, AN3822,25,27 (L 8,13,26)
SYN	AN38K	2.400	V	V 09/15/82 COMPSOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX, AN3818,21,23,24,26,44 (L 1-4,7-14)
SYN	AN38L	60.200	V	V 09/15/82 COMPOSITE SOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX, AN3827-30,40 (L 15-24)
SYN	AN38M	.800	U J	V 09/15/82 COMPOSITE SOIL SAMPLE FROM LAGOON COLLECTED BY SYNTEX, AN3836,39,41 (L 25-30)
SYN	AQ3401	.001	U	V NOT <sup>MAP</sup> 02/23/83 WATER(WELL) SAMPLE FROM CARTER'S RESIDENCE AT VERONA, MO.
SYN	AQ3402	.001	U	V 02/23/83 WATER(WELL) SAMPLE FROM MARTIN'S RESIDENCE AT VERONA, MO.
SYN	AQ3403	.001	U	V 02/24/83 WATER SAMPLE FRM EMPIRE ELECTRIC WELL AT VERONA, MO.
SYN	AQ3404	.360	U	V 02/24/83 SOIL SAMPLE FRM WESTERN FENCE ROW AT HADDOCK FARM IN VERONA, MO.
SYN	AQ3405	1.270	V	V 02/24/83 SOIL SAMPLE FRM EASTERN FENCE ROW AT HADDOCK FARM IN VERONA, MO.
SYN	AQ3406	5.560	V	V 02/24/83 SOIL SAMPLE FRM S END OF #1 SLOUGH AREA AT HADDOCK FARM, VERONA, MO.
SYN	AQ3407	8.440	V	V 02/24/83 SOIL SAMPLE FRM SOUTH CENTRAL SOUTH END OF #2 SLOUGH AREA AT HADDOCK FARM,VERONA,MO.
SYN	AQ3408	.600	U	V 02/24/83 SOIL SAMPLE FRM NORTH #3 SLOUGH AREA AT HADDOCK FARM IN VERONA, MO.
SYN	AT4501	1.000	U J	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (150)
SYN	AT4504	.580	U	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (153)
SYN	AT4508	1.000	U J	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #4 COLLECTED BY SYNTEX (157)
SYN	AT4509	.000	I	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #4 COLLECTED BY SYNTEX (158)
SYN	AT4516	4.500	J	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #3 COLLECTED BY SYNTEX (166)
SYN	AT4518	.250	U	V 09/15/82 DISCRETE SOIL SAMPLE FRM TRENCH #3 COLLECTED BY SYNTEX (164)
SYN	AT4521	.250	U	V 09/15/82 WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (150)
SYN	AT4522	.250	U	V 09/15/82 WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (151)
SYN	AT4523	.000	I	V 09/15/82 WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (152)
SYN	AT4524	.000	I	V 09/15/82 NATER SAMPLE COLLECTED BY SYNTEX (153)
SYN	AT4525	41.000	V	V 09/15/82 DISCRETE WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (154)
SYN	AT4526	.250	U	V 09/15/82 WATER SAMPLE FRM TRENCH #4 COLLECTED BY SYNTEX (155)
SYN	AT4527	.250	U	V 09/15/82 WATER SAMPLE FRM PERIMETER COLLECTED BY SYNTEX (206)
SYN	AT4528	.250	V	V 09/15/82 WATER SAMPLE FRM TRENCH #4 COLLECTED BY SYNTEX (157)
SYN	AT4529	.250	U	V 09/15/82 WATER SAMPLE COLLECTED BY SYNTEX (158)
SYN	AT4530	.250	U	V 09/15/82 WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (156)
SYN	AT4531	.250	U	V 09/15/82 WATER SAMPLE COLLECTED BY SYNTEX AND NUMBER
SYN	AT4541	.250	U	V 09/15/82 DISCRETE SOIL SAMPLE FRM PERIMETER COLLECTED BY SYNTEX (148)
SYN	AT4542	.250	U	V 09/15/82 DISCRETE SOIL SAMPLE FRM PERIMETER COLLECTED BY SYNTEX (148)
SYN	AT4546	.250	U	V 09/15/82 WATER SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX (155)
SYN	AT4556	.250	U	V 09/15/82 COMPOSER SOIL SAMPLE FRM PERIMETER COLLECTED BY SYNTEX AND NUMBER (157-205)
SYN	AT4556	.250	U J	V 09/15/82 COMPSOIL SMPLE FROM PERIMETER COLLECTED BY SYNTEX AND NUMBER (205,207,18-147)
SYN	AT4556	3.350	V	V 09/15/82 COMPOSER SOIL SAMPLE FRM TRENCH #5 COLLECTED BY SYNTEX AND NUMBER (158-165)
SYN	AT4559	.500	U J	V 09/15/82 COMPOSER SOIL SMPLE FROM TRENCH #5 COLLECTED BY SYNTEX AND NUMBER (160-167)
SYN	AT4559	3.000	I	V 09/15/82 COMPOSER SOIL SMPLE FROM TRENCH #4 COLLECTED BY SYNTEX AND NUMBER (160-165)
SYN	AT4559	1.000	I	V 09/15/82 COMPOSER SOIL SMPLE FROM TRENCH #4 COLLECTED BY SYNTEX AND NUMBER (160-165)

**Trench Area  
Total Dioxin Analyses  
By Capillary Electron Capture  
on Chromatography**  
**Results in Parts per Billion  
Corrected for Water Content  
Based on Certified Standard**



## EXISTING LAGOON



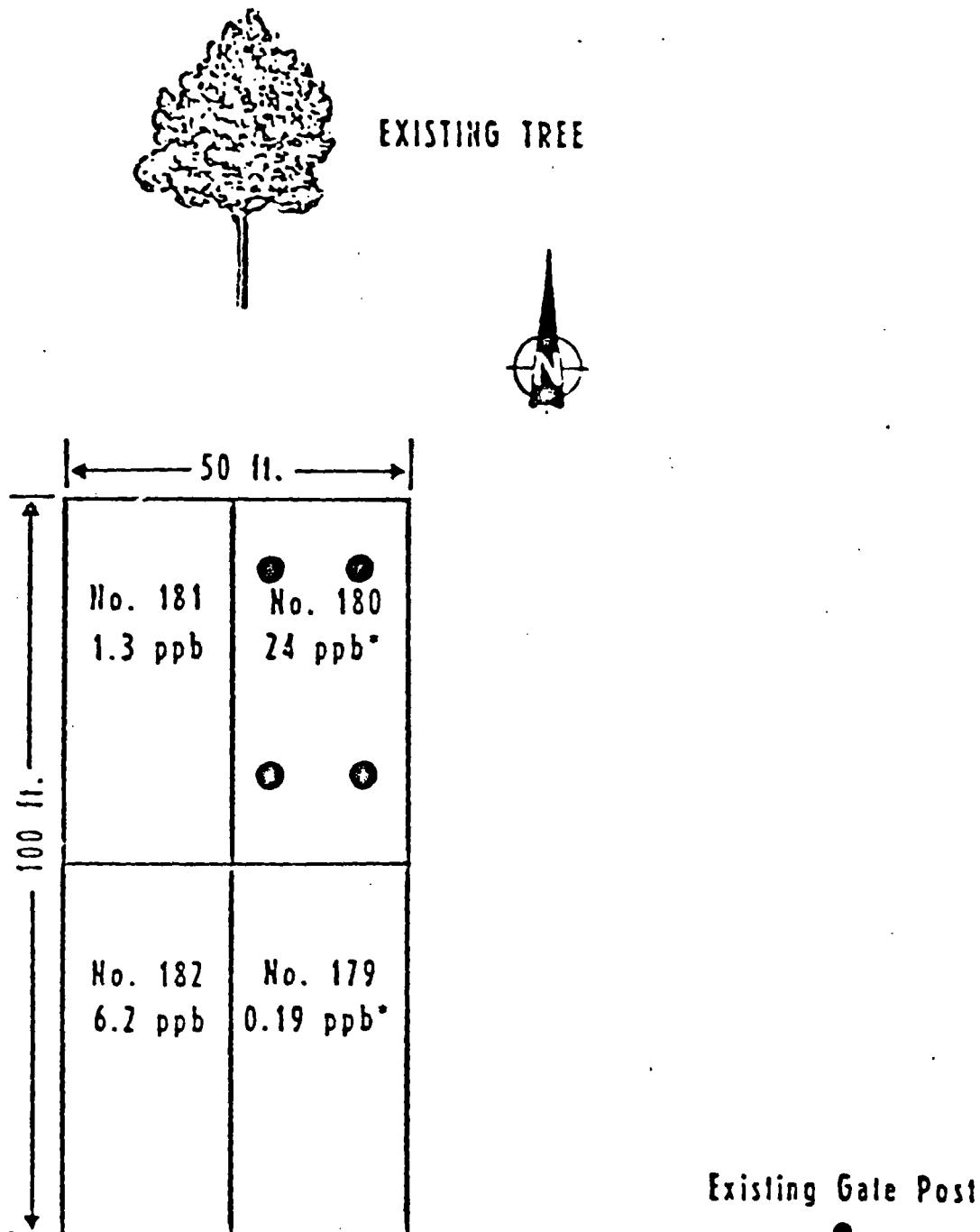
**LAGOON AREA**  
**Total Dioxin Analyses**  
**By Capillary Electron Capture Gas Chromatography**

Results in Parts per Billion (ppb)

Corrected for Water Content

Based on Certified Standard

\*AVERAGE OF DUPLICATE ANALYSES



## BURN AREA

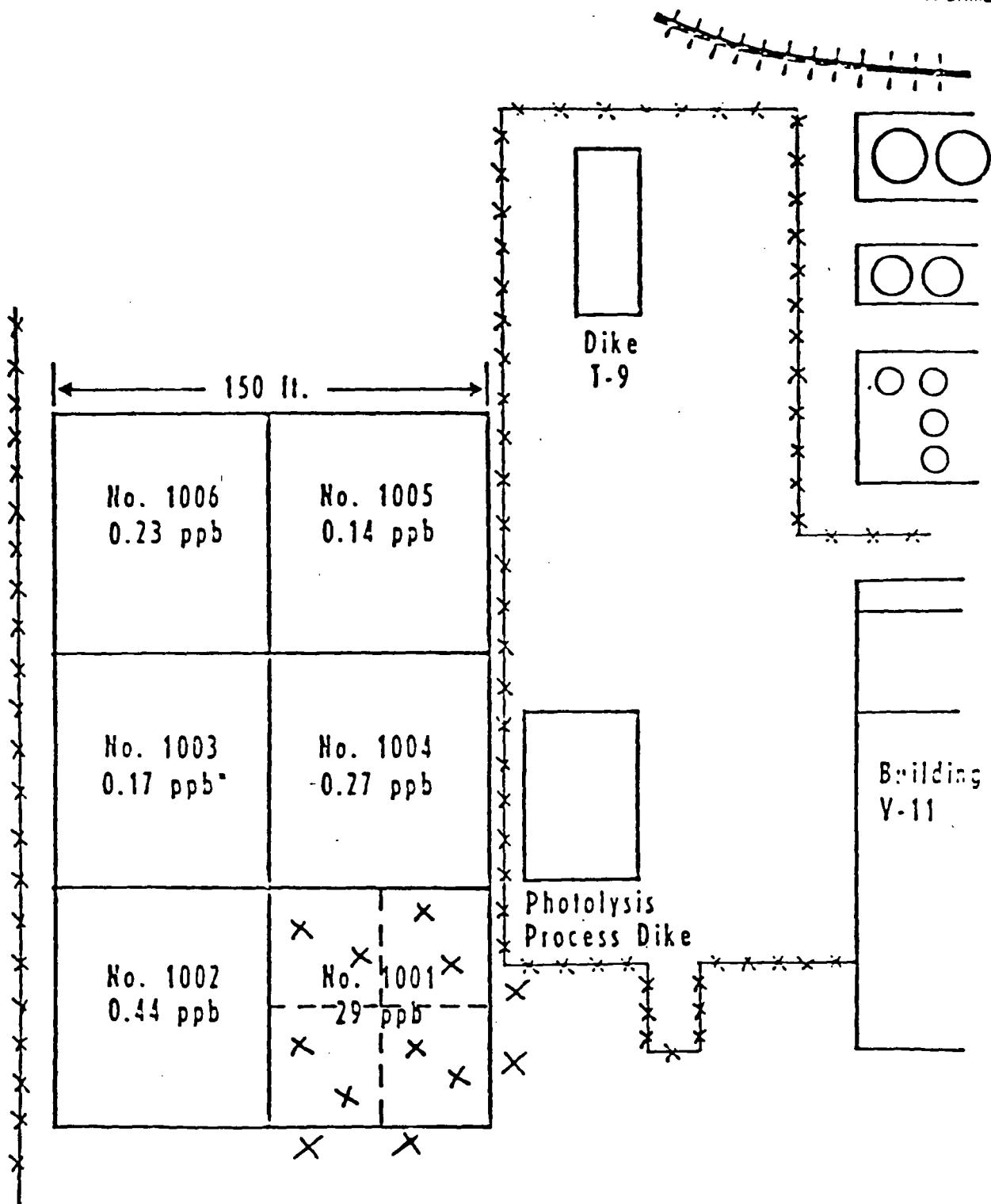
Total Dioxin Analyses  
By Capillary Electron Capture Gas Chromatography

Results in Parts per Billion (ppb)

Corrected for Water Content

Based on Certified Standard

\*AVERAGE OF DUPLICATE ANALYSES



## NEPACCO SPRAY IRRIGATION AREA

Total Dioxin Analyses  
By Capillary Electron Capture Gas Chromatography

Results in Parts per Billion (ppb)

Corrected for Water Content

Based on Certified Standard

\* AVERAGE OF DUPLICATE ANALYSES

**LEGEND**

**PRIORITY AND NON-PRIORITY POLLUTANTS**

**SYNTEX AREA**

**VERONA, MISSOURI**

**April, 1984**

@ Concentration in parts per billion (ppb) unless otherwise indicated.

\*\* Tentatively identified compound; estimated concentration.

\* Non-priority pollutant

(M) = Value is below the quantification limit, but above the detection limit.

(J) = Value is approximate.

LT = Compound is present, but at a concentration below the detection limit.

1 = Volatile and pesticide fraction not analyzed.

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT45A -- Trench Area Composite Soil Sample A

Compound	CAS #	Concentration (ppb)	Fraction
1-chlorododecane**	1002-69-3	330	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45B -- Trench Area Composite Soil Sample B

Compound	CAS #	Concentration (ppb)	Fraction
PCB - 1242	53469-21-9	11300	Pesticide
PCB - 1254	11097-69-7	580	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45C -- Trench Area Composite Soil Sample C

Compound	CAS #	Concentration (ppb)	Fraction
PCB - 1242	53469-21-9	300	pesticide
PCB - 1254	11097-69-7	240	"
Methylene chloride	75-09-2	73	volatile
1,1-oxybisethane**	60-29-7	2.5	"
2H-Pyrol-2-one,-1,5-dihydro- 1-methyl**	13950-21-5	400	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45D -- Trench Area Composite Soil Sample D

Compound	CAS #	Concentration (ppb @)	Fraction
2,4,6-trichlorophenol	88-06-2	890	acid
2,4-dichlorophenol	122-83-2	610	"
phenol	108-95-2	730	"
benzoic acid*	65-85-0	11.1 ppm	"
4-methylphenol*	108-39-4	1500	"
1,4-dichlorobenzene	106-46-7	480	base-neutral
naphthalene	91-20-3	4040	" "
anthracene	120-12-7	520	" "
2-methylnaphthalene*	91-64-9	5250	" "
chlorobenzene	108-90-7	3.2	volatile
methylene chloride	75-09-2	49	"
2 methyl-2 propenol**	75-65-0	9.1	ABN
1,3-dimethyl-transcyclopentane**	1759-58-6	4.8	"
methyl cyclohexane**	108-87-2	57	"
isooctanol**	26952-2-21-6	12	"
bicyclo-4.1.0-hept-3-ene, 3,7,7-trimethyl**	13466-78-9	5	"
hexanoic acid**	142-62-1	1000	"
tetradecane**	629-53-4	430	"
1,7-dimethyl-naphthalene**	575-37-1	380	"
1,8-dimethyl-naphthalene**	569-41-5	830	"
pentadecane**	629-62-9	620	"
hexadecane**	544-76-3	910	"
octadecane**	593-45-3	10 ppm	"
eicosane**	112-95-8	7600	"
hercicosane**	629-44-7	3400	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45E -- Trench Area Composite Soil Sample E

Compound	CAS #	Concentration (ppb@)	Fraction
4-methylphenol*	108-39-4	3250	acid
acenaphthene	83-32-9	3250	base-neutral
1,4-dichlorobenzene	106-46-7	3030	"
naphthalene	91-20-3	220 ppm	" "
bis (2-ethylhexy) phthalate	117-81-7	5410	" "
fluorene	86-73-7	11.9 ppm	" "
phenanthrene	85-01-8	64.9 ppm	" "
2-methylnaphthalene*	91-57-6	595 ppm	" "
ethylbenzene	100-41-4	33	volatile
methylene chloride	75-09-2	50	"
toluene	108-88-3	30	"
o-xylene*	95-47-6	200 ppm	"
1,3-dimethyl benzene**	108-38-3	11	"
3-buten-2-one**	78-94-4	23	"
1,2,4-trimethyl benzene**	95-63-6	17 ppm	ABN
2-ethyl-1,4-dimethylbenzene**	1758-88-9	41 ppm	"
eicosane**	112-95-8	58 ppm	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45F -- Trench Area Composite Soil Sample F

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	12.1	volatile
methyl cyclohexane**	108-87-2	930	ABN
3,3-dimethyl hexane**	563-16-6	3100	"
1,7-dimethyl naphthalene**	575-37-1	220	"
undecane**	1120-21-4	560	"
hexadecane**	544-76-3	990	"
2-methyl undecane**	7045-71-8	700	"
1,5-dimethyl naphthalene**	571-61-9	390	"

## PRIORITY AND NON-PRIORITY POLLUTANTS

## SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT45G -- Trench Area Composite Soil Sample G

Compound	CAS #	Concentration (ppb <sup>@</sup> )	Fraction
2-methylphenol*	108-39-4	6440	acid
naphthalene	91-20-3	50.6 ppm	base-neutral
anthracene	120-12-7	27.6 ppm	" "
fluorene	86-73-7	6440	" "
2-methylnaphthalene*	91-57-6	117.3 ppm	" "
methylene chloride	75-87-3	94	volatile
fluorotrichloromethane	75-69-4	8.5	"
hexane**	110-54-3	2.3	"
1,2,4-trimethyl benzene**	95-63-6	9000	ABN
tridecane*	629-50-5	32 ppm	"
undecane**	1120-21-4	33 ppm	"
1,8-dimethyl naphthalene**	569-41-5	38 ppm	"
hexadecane**	544-76-3	43 ppm	"
octadecane**	593-45-3	39 ppm	"
eicosane**	112-95-8	11 ppm	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT4501 -- Trench Area Soil Sample T1

Compound	CAS #	Concentration (ppb <sup>0</sup> )	Fraction
naphthalene	91-20-3	10.1 ppm	base-neutral
fluorene	86-73-7	1110	" "
phenanthrene	85-01-8	2770	" "
dibenzofuran*	132-64-9	1110	" "
2-methylnaphthalene*	91-57-6	10.1 ppm	" "
methylene chloride	75-09-2	45	volatile
1-methyl-2-(2-propenyl)benzene**	1587-04-8	2300	ABN
2-methyl undecane**	7045-71-8	1100	"
2,7-dimethyl naphthalene**	582-16-1	5000	"
1,8-dimethyl naphthalene**	569-41-5	7800	"
1,6,7-trimethyl naphthalene**	2245-38-7	3800	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4504 -- Trench Area Soil Sample T4

Compound	CAS #	Concentration (ppb <sup>d</sup> )	Fraction
naphthalene	91-20-3	1700	base-neutral
phenanthrene	85-01-8	18 ppm	" "
di-n-butyl phthalate	84-74-2	550 (M)	" "
phenol	108-95-2	800 (J)	acid
2,6-dimethyl undecane**		10 ppm	ABN
1-methyl naphthalene **	90-12-0	20 ppm	"
2,3-dimethyl naphthalene **		30 ppm	"
2-(1-methylethyl) naphthalene **		20 ppm	"
2,3,6-trimethyl naphthalene **	829-26-5	20 ppm	"
dodecane**	112-40-3	9000	"
2,6,10,14-tetramethyl heptadecane**		20 ppm	"
2,6,10,14-tetramethyl pentadecane**	1921-70-6	30 ppm	"
undecane**	1120-21-4	20 ppm	"
phenanthrene, methyl isomer**		8000	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT4508 -- Trench Area Soil Sample T8

Compound	CAS #	Concentration (ppb@)	Fraction
naphthalene	91-20-3	355 ppm	base-neutral
fluorene	86-73-7	58 ppm	" "
phenanthrene	85-01-8	120 ppm	" "
acenaphthene	83-32-9	LT	" "
bis (2-ethylhexyl) phthalate	117-81-7	LT	" "
dibenzofuran*	132-64-9	40 ppm	" "
2-methylnaphthalene*	91-57-6	1.4%	" "
ethyl benzene	100-41-4	LT	volatile
methylene chloride	75-09-2	21	"
toluene	108-88-3	LT	"
o-xylene*	95-47-6	75	"
1,2,4-trimethyl benzene**	95-63-6	26 ppm	ABN
2-methyl naphthalene**	91-57-6	140 ppm	"
1,8-dimethyl naphthalene**	569-41-5	260 ppm	"
1,6,7-trimethyl naphthalene**	2245-38-7	76 ppm	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4509 -- Trench Area Soil Sample T9

Compound	CAS #	Concentration (ppb <sup>®</sup> )	Fraction
naphthalene	91-20-3	3000	base-neutral
phenanthrene	85-01-8	6200	" "
di-n-butyl phthalate	84-74-2	300 (M)	" "
phenol	108-95-2	2000 (J)	acid
2-methyl naphthalene **	91-57-6	20 ppm	ABN
1,5-dimethyl naphthalene **	571-61-9	20 ppm	"
pentadecane **	629-62-9	20 ppm	"
hexadecane **	544-76-3	20 ppm	"
5 propyl tridecane **	55045-11-9	20 ppm	"
undecane **	1120-21-4	30 ppm	"
octadecane **	593-45-3	20 ppm	"
eicosane **	112-95-8	20 ppm	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT4518 -- Trench Area Soil Sample T15

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	30	volatile
propanoic acid**	79-09-4	2600	ABN
pentanoic acid**	109-52-4	390	"
2-methyl benzaldehyde**	529-20-4	1100	"
eicosane**	122-95-8	260	"

## PRIORITY AND NON-PRIORITY POLLUTANTS

## SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4516 -- Trench Area Soil Sample T17

Compound	CAS #	Concentration (ppb <sup>®</sup> )	Fraction
2,4-dichlorophenol	122-83-2	5760	acid
phenol	108-95-2	3670	"
4-methyl phenol*	108-39-4	4980	"
2,4,5-trichlorophenol*	95-95-4	20.7 ppm	"
1,2,4-trichlorobenzene	120-82-1	3670	base-neutral
1,4-dichlorobenzene	106-46-7	20.2 ppm	" "
naphthalene	91-20-3	8650	" "
bis (2-ethylhexyl) phthalate	117-81-7	1890	" "
fluorene	86-73-7	1048	" "
2-methylnaphthalene*	91-57-6	11 ppm	" "
chlorobenzene	108-90-7	8.9	volatile
methylene chloride	75-09-2	62.9	"
toluene	108-88-3	9.9	"
tridecane**	629-50-5	5400	ABN
1,2,3,5-tetrachlorobenzene**	534-80-2	3500	"
2,7-dimethyl naphthalene**	582-16-1	4700	"
1,8-dimethyl naphthalene**	569-41-5	8700	"
1,2,4-trichloro-3-methoxy-benzene**	50375-10-5	2700	"
hexadecane**	544-76-3	14 ppm	"
eicosane**	112-95-8	21 ppm	"
2 methyl-2 propanol**	75-65-0	6.3	volatile
methyl cyclohexane**	108-87-2	20	"
isooctanol**	26952-21-6	5.5	"
3,7,7-trimethyl bicyclo[4.1.0]hept-3-ene**	13466-78-9	11	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4541 -- Trench Area Soil Sample P10

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	31.9	volatile
toluene	108-88-3	3.9	"
1,3,5-cycloheptatriene**	544-25-2	1600	ABN
1-hexen-3-ol**	4798-44-1	400	"
pentylester propanoic acid**	624-54-4	3500	"
octacosane**	630-02-4	540	"
2,7-dimethyl octane**	1072-16-8	320	"
0-decyl hydroxylamine**	29812-79-1	390	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4521 -- Trench Area Water Sample Tl<sup>1</sup>

Compound	CAS #	Concentration (ppb <sup>a</sup> )	Fraction
acenaphthene	83-32-9	370	base-neutral
naphthalene	91-20-3	4030	" "
fluorene	86-73-7	870	" "
phenanthrene	85-01-8	2390	" "
dibenzofuran*	132-64-9	430	" "
2-methylnaphthalene*	91-57-6	17 ppm	" "
2-ethyl-1,4-dimethyl benzene**	1758-88-9	2000	ABN
2-methyl naphthalene**	91-57-6	3400	"
1,8-dimethyl naphthalene**	569-41-5	9900	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT4522 -- Trench Area Water Sample T2<sup>1</sup>

Compound	CAS #	Concentration (ppb <sup>2</sup> )	Fraction
4-methylphenol*	108-39-4	LT	acid
acenaphthene	83-32-9	900	base-neutral
naphthalene	91-20-3	7500	" "
fluorene	86-73-7	1800	" "
phenanthrene	85-01-8	5000	" "
aniline*	62-53-3	2400	" "
dibenzofuran*	132-64-9	1450	" "
2-methylnaphthalene*	91-57-6	32.5 ppm	" "
1,2,4-trimethyl benzene**	95-63-6	960	ABN
1-methyl naphthalene**	90-12-0	2800	"
2,7-dimethyl naphthalene**	582-16-1	3400	"
1,8-dimethyl naphthalene**	569-41-5	6300	"
2,3,6-trimethyl naphthalene**	829-26-5	5000	"
octadecane**	593-45-3	4600	"
eicosane**	112-95-8	2000	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4523 -- Trench Area Water Sample T3<sup>1</sup>

Compound	CAS #	Concentration (ppb <sup>②</sup> )	Fraction
pentachlorophenol	87-36-5	400	acid
phenol	108-95-2	240	"
4-methyl phenol*	108-39-4	1100	"
naphthalene	91-20-3	1300	base-neutral
fluorene	86-73-7	220	" "
phenanthrene	85-01-8	380	" "
dibenzofuran*	132-64-9	LT	" "
2-methylnaphthalene*	91-57-6	3500	" "
1,3,5-trimethyl benzene**	108-67-8	570	ABN
2-methyl naphthalene**	91-57-6	4000	"
3 methyl-2 pentanone **	565-61-7	320	"
1 ethyl naphthalene **	1127-76-0	1200	"
1,8-dimethyl naphthalene **	569-41-5	6700	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4524 -- Trench Area Water Sample T4<sup>1</sup>

Compound	CAS #	Concentration (ppb@)	Fraction
naphthalene	91-20-3	4800	base-neutral
n-nitrosodiphenylamine	86-30-6	8400	" "
phenanthrene	85-01-8	LT	" "
2-methylnaphthalene *	91-57-6	30 ppm	" "
1,7-dimethyl naphthalene **	575-37-1	28 ppm	ABN
1,8-dimethyl naphthalene **	569-41-5	42 ppm	"
2,3,6-trimethyl naphthalene **	829-26-5	13 ppm	"
1,6,7-trimethyl naphthalene **	2245-38-7	27 ppm	"
0-decyld hydroxylamine **	29812-79-1	11 ppm	"
4-8-dimethyl tridecane **	55030-62-1	5500	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AT4526 -- Trench Area Water Sample T6<sup>1</sup>

Compound	CAS #	Concentration (ppb)	Fraction
acenaphthene	83-32-9	LT	base-neutral
1,4-dichlorobenzene	106-46-7	LT	" "
naphthalene	91-20-3	1210	" "
fluorene	86-73-7	550	" "
phenanthrene	85-01-8	1330	" "
aniline*	62-53-3	1250	" "
dibenzofuran*	132-64-9	320	" "
2-methylnaphthalene*	91-57-6	7020	" "
pentadecane**	629-62-9	2000	ABN
hexadecane**	544-76-3	3200	"
2,3-dihydro-4-methyl-1-H-indene**	824-22-6	850	"
1,7-dimethyl naphthalene**	575-37-1	800	"
1,8-dimethyl naphthalene**	569-41-5	1300	"

## BORING LOG

Composite Sample: Trench Perimeter #11  
 Date: September 1, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
148	TP-11	1	0-3.0	SILTY CLAY FILL, Red Brown changing to SILTY CLAY, Gray at 4 feet changing to SILTY CLAY, Red Brown at 6 feet. Pieces of chert from sand to cobble size throughout sample.
		2	3.0-5.5	
		3	5.5-8.0	
		4	8.0-10.5	
		5	10.5-13.0	
		6	13.0-15.0	

Composite Sample: Trench Perimeter #12  
 Date: September 1, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
149	TP-12	1	0-3.0	SILTY CLAY, Red Brown and Gray changing to SILTY CLAY, Red Brown at 2 feet. Pieces of chert throughout soils. Ranging in size from sand to cobbles.
		2	3.0-5.5	
		3	5.5-8.0	
		4	8.0-10.5	
		5	10.5-13.0	
		6	13.0-15.0	

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4528 -- Trench Area Water Sample T8<sup>1</sup>

Compound	CAS #	Concentration (ppb <sup>②</sup> )	Fraction
acenaphthene	83-32-9	LT	base-neutral
naphthalene	91-20-3	13 ppm	" "
di-n-butyl-phthalate	84-74-2	1400	" "
fluorene	86-73-7	2300	" "
phenanthrene	85-01-8	5500	" "
dibenzofuran*	132-64-9	1600	" "
2-methylnaphthalene*	91-57-6	47 ppm	" "
1,2,4-trimethyl benzene**	95-63-6	480	ABN
1-ethyl-3,5-dimethyl benzene**	934-74-7	411	"
tridecane**	629-50-5	1600	"
hexadecane**	544-76-3	1900	"
1,8-dimethyl naphthalene**	569-41-5	2400	"
5-propyl tridecane**	55045-11-9	1300	"
eicosane**	112-95-8	2500	"

## BORING LOG

Composite Sample: Trench #1  
 Date: September 2, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
150	T-1	1	0-1.5	2	3 inches of Red Brown CLAYEY SILT, some pieces of chert changing to Black filter cake and other material
		2	1.5-3.0	12	
		3	3.0-4.5	12	pieces of plastic, very soft and wet changing to CLAYEY SILT, Red Brown with Chert
		4	4.5-6.0	4	at 4.3 feet

Composite Sample: Trench #2  
 Date: September 2, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
151	T-2	1	0-1.5	3	CLAYEY SILT, Red Brown, cover 1" thick over fill
		2	1.5-3.0	2	material consisting of black filter cake, plastic and other changing to CLAYEY
		3	3.0-4.5	0	SILT, Red Brown with pieces
		4	4.5-6.0	4	of chert at 7'. Final SS
		5	6.0-7.5	6	pounded only 6" due to
		6	7.5-8.0	6	large piece of chert blocking path.

## BORING LOG

Composite Sample: Trench Perimeter #2  
 Date: August 26, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
151	TP-2	1	0-1.5	3	SILTY CLAY with Pieces of Chert, Red Brown
		2	1.5-3.0	9	SILTY CLAY with Pieces of Chert, Red Brown
		3	3.0-4.5	15	SILTY CLAY with Pieces of Chert, Red Brown
		4	4.5-6.0	6	SILTY CLAY with Pieces of Chert, Red Brown
		5	6.0-7.5	10	SILTY CLAY with Pieces of Chert, Red Brown
		6	7.5-9.0	15	SILTY CLAY with Pieces of Chert, Red Brown
		7	9.0-10.5	18	SILTY CLAY with Pieces of Chert, Red Brown
		8	10.5-12.0	12	SILTY CLAY with Pieces of Chert, Red Brown
		9	12.0-13.5	4	SILTY CLAY with Pieces of Chert, Red Brown
		10	13.5-15.0	10	SILTY CLAY with Pieces of Chert, Red Brown

## BORING LOG

Composite Sample: Trench #3  
 Date: September 2, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
12	1	0-1.5		Fill material from 0 to 8 feet filter cakes, drum pieces and plastic.
	2	1.5-3.0		
	3	3.0-4.5		
	4	4.5-6.0		
	5	6.0-7.5		
	6	7.5-9.0		
				SILTY CLAY, Red Brown at 8.0 feet

Composite Sample: Trench #4  
 Date: September 3, 1982  
 Water Sample: Yes

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
13	1	0-1.5	2	3" Red Brown SILTY CLAY cover over fill material containing plant wastes which include filter cake, cardboard and plastic changing to Red Brown SILTY CLAY with chert at 4.0'. Bottom of Boring at 6.0'. Water in boring at 2.0'.
	2	1.5-3.0	2	
	3	3.0-4.5	10	
	4	4.5-6.0	10	

## BORING LOG

Composite Sample: Trench #5  
 Date: September 3, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
154	T-5	1	0-1.5	3
		2	1.5-3.0	4
		3	3.0-4.5	4
		4	4.5-6.0	0
		5	6.0-7.5	4
		6	7.5-9.0	7

Composite Sample: Trench #6  
 Date: September 3, 1982  
 Water Sample: Yes

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
155	T-6	1	0-1.5	3
		2	1.5-3.0	3
		3	3.0-4.5	0
		4	4.5-6.0	10
		5	6.0-7.5	2
		6	7.5-9.0	7
		7	9.0-10.0	4

## BORING LOG

Composite Sample: Trench #7  
 Date: September 7, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
156	T-7	1	0-1.5	4
		2	1.5-3.0	4
		3	3.0-4.5	3
		4	4.5-6.0	Auger Refusal in steel and pipes at 2.0'. Restarted. Second attempt there was very little fill only at top. Area shows little or no subsidence and therefore probably wasn't excavated

Composite Sample: Trench #8  
 Date: September 7, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
157	T-8	1	0-1.5	2
		2	3.5-5.0	5
		3	5.0-6.5	0
		4	6.5-8.0	4
		5	8.0-9.5	4
		6	9.5-11.0	10
		7	11.5-13.0	7
				Red Brown SILTY CLAY cover over fill material. First spoon dropped from 0.5 to 3.5 feet on one blow. Little or no recovery. Second spoon was adjusted for this and started at 3.5' to 5.0' this spoon contained sample of filter cake material. Third spoon from 5.0 to 6.5 feet, no sample retrieved, appears that there is a void in this area.
				Samples 4, 5 and 6 contained filter cake and Sample 6 contains some Red Brown SILTY CLAY at bottom of spoon.

## BORING LOG

Composite Sample: Trench #9  
 Date: September 8, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
158	T-9	1	0-1.5	2	Piece of chert blocked path
		2	1.5-3.0	6	
		3	3.0-4.5	3	
		4	4.5-6.0	18	
		5	6.0-7.5	18	
		6	7.5-9.0	15	Red Brown SILTY CLAY cover over fill material containing filter cake, burn material. Fill material very soft, poor recoveries in top, excellent recoveries after it stiffened up
		7	9.0-10.5	12	Red Brown SILTY CLAY with chert at 10.0'
		8	10.5-12.0		

Composite Sample: Trench #10  
 Date: September 9, 1982  
 Water Sample: No

	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
159	T-10	1	0-1.5	4	Red Brown SILTY CLAY cover over ash, filter cake and other fill material.
		2	1.5-3.0	4	
		3	3.0-4.5	0	Sample 3 appeared to go through a drum, probably empty. Red Brown SILTY CLAY at 4.0'
		4	4.5-6.0		

## BORING LOG

Composite Sample: Trench #11  
 Date: September 8, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
160	T-11	1	0-1.5		Gray SILTY CLAY to Red Brown SILTY CLAY at 1.0', Probably Fill Top 3.0'
		2	1.5-3.0		
		3	3.0-4.5		Red Brown SILTY CLAY AND CHERT

Composite Sample: Trench #12  
 Date: September 8, 1982  
 Water Sample: No

	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
161	T-12	1	0-1.5	4	Brown CLAYEY SILT to Red Brown SILTY CLAY at 1.0' All samples probably natural
		2	1.5-3.0	6	
		3	3.0-4.5	6	

## BORING LOG

Composite Sample: Trench #19  
 Date: September 8, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
163	T-19	1	0-1.5	3	Red Brown SILTY CLAY cover over fill. Fill contains filter cake, sandy material and burn material.
		2	1.5-3.0	3	
		3	3.0-4.5	8	
		4	4.5-6.0	3	
		5	6.0-7.5	10	
		6	7.5-9.0	9	Spoon #6 was bouncing before breaking through possible drum.
		7	9.0-10.5		
		8	10.5-12.0		Red Brown SILTY CLAY with pieces of chert at 10.0'

Composite Sample: Trench #20  
 Date: September 8, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
162	T-20	1	0-1.5	4
		2	1.5-3.0	0
		3	3.0-3.5	Possible Drum at 4 inches Red Brown SILTY CLAY cover over the fill, Possible void after drum or inside drum
		4	5.0-6.5	Red Brown SILTY CLAY with Chert at 4.0'

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Trench #17  
 Date: September 9, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
165	T-17	1	0-1.5	4	Red Brown SILTY CLAY cover approximately 2' over a black fill material to 6', a gray fill material to 8' to Red Brown SILTY CLAY
		2	1.5-3.0	4	
		3	3.0-4.5	6	
		4	4.5-6.0	8	
		5	6.0-7.5	10	
		6	7.5-9.0	10	
		7	9.0-10.5	10	

Composite Sample: Trench #18  
 Date: September 9, 1982  
 Water Sample: Yes

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
64	T-18	1	0-1.5	3 FILL, Red Brown Silty Clay with Chert
		2	1.5-3.0	3
		3	3.0-4.5	3 Fill containing various plant wastes at 4.5'. Fill contains various filter cakes, plastic
		4	5.0-6.5	7
		5	7.0-8.5	7
		6	8.5-10.0	12
		7	10.0-11.5	14
		8	11.5-13.0	Red Brown SILTY CLAY with chert at 12.0'

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Trench #15  
 Date: September 9, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
167	T-15	1	0-1.5	5	Red Brown SILTY CLAY
		2	1.5-3.0	3	
		3	3.0-4.5	0	Plant Waste Fill
		4	4.5-6.0	0	
		5	6.0-7.5	10	
		6	7.5-9.0	7	
		7	9.0-10.5	7	
		8	10.5-12.0	3	Red Brown SILTY CLAY at 11'

Composite Sample: Trench #16  
 Date: September 9, 1982  
 Water Sample: Yes

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
16	T-16	1	0-1.5	4
		2	1.5-3.0	0
		1	0-1.5	6
		2	1.5-3.0	4
		3	3.0-3.4	2
		4	4.5-6.0	#3 blockage at bottom of H.S.
		4A	7.0-8.5	First attempt #4, auger blocked, removed auger
		5	8.5-10.0	Sample 4A taken from 1.0' deeper
		6	10.0-11.5	Fill consisted of Black Silty material or other plant wastes
		7	11.5-13.0	Red Brown SILTY CLAY at 11.4'

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Trench #13  
 Date: September 10, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
169	T-13	1	0-1.5	4	Red Brown SILTY CLAY
		2	1.5-3.0	2	FILL at 2.0'. Restarted due to blockage at 4.5'
		1	0-1.5		Red Brown SILTY CLAY
		2	1.5-3.0		Fill Material at 2.0'
		3	3.0-4.5		
		4	4.5-6.0		
		5	6.0-7.5		Red Brown SILTY CLAY at 6.5'
		6	7.5-9.0		

Composite Sample: Trench #14  
 Date: September 10, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
18	T-14	1	0-1.5	4
		2	1.5-3.0	3
		3	3.0-4.5	4
		4	4.5-6.0	Waste plant fill containing white and gray filter cake at 4.0'
		5	6.0-7.5	4
		6	7.5-9.0	7
		7	9.0-10.5	Red Brown SILTY CLAY, TRACE CHERT at 8.9'

## BORING LOG

Composite Sample: Burn Area #1  
 Date: August 17, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u>	<u>Recovery</u> (in)	<u>Description</u>
-1	1	0.0-1.5	14	FILL, SANDY SILT, Brown
	2	1.5-3.0	10	FILL, SANDY SILT, Brown changing to NATURAL CLAYEY SILT, Brown at 2.5'

179

2	1	0.0-1.5	?	CLAYEY SILT FILL changing to CLAYEY SILT FILL and Burn Material
	2	1.5-3.0		FILL and Burn Material

Composite Sample: Burn Area #2  
 Date: August 17, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
3	1	0.0-1.5	12	CLAYEY SILT, Dark Brown changing to SILT, Brown and 6 inches Burn Material
	2	1.5-3.0	12	Burn Material and 4' wood pieces
4	1	0.0-1.5	4	Topsoil, Piece of Gravel at Bottom, probably natural
	2	1.5-3.0	4	CLAYEY SILT with Sand, Probably Natural

180

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Burn Area #3  
 Date: August 17, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
5	1	0.0-1.5	12	CLAYEY SILT, Brown changing to Burn Material at 1.0'
	2	1.5-3.0	6	CLAYEY SILT, Brown.
6	1	0.0-1.5	10	CLAYEY SILT, Brown and trash
	2	1.5-1.7	4	Moved 10' South and reattempted Sample 2
	2	1.5-3.0		CLAYEY SILT, Brown

Composite Sample: Burn Area #4  
 Date: August 17, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
7	1	0.0-1.5	14	CLAYEY SILT, Brown, Burn Material at Bottom
	2	1.5-3.0	10	CLAYEY SILTY SAND, Brown, Burn Material, Possibly Natural at Bottom
8	1	0.0-1.5	14	CLAYEY SILT, Brown, Burn Material mixed at Bottom of Sample
	2	1.5-3.0	10	CLAYEY SILT, Brown

## BORING LOG

Composite Sample: Lagoon Area #1  
 Date: August 18, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-1	1	0.0-1.5	18	SILTY CLAY, Little Clay Trace Sand, Brown
	2	1.5-3.0	18	SILTY CLAY, Little Clay Trace Sand, Brown
	3	3.0-4.5	12	SILTY CLAY, Little Clay Trace Sand, Brown
L-2	1	0.0-1.5	7	SILT, Little Clay Trace Sand Brown
	2	1.5-2.5	7	SILT, Little Clay Trace Sand Brown
	3	2.5-4.0	7	SILT, Little Clay Trace Sand Brown

Composite Sample: Lagoon Area #1  
 Date: August 18, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-3	1	0.0-1.5	18	SILT, Little Clay, Brown
	2	1.5-2.5	10	SILT, Little Clay, Brown
	3	2.5-4.0	18	Dark Gray Material, throughout, Sample Very Soft in Middle
L-4	1	0.0-1.5	18	SILT, Little Clay, Brown
	2	1.5-2.5	10	SILT, Little Clay, Brown
	3	2.5-4.0	17	Dark Gray Staining at Bottom

## BORING LOG

Terracon Consultants,

Composite Sample: Lagoon Area #3  
 Date: August 18, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

Sample #

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-5	1	0.0-1.5	8	SILT, Little Clay, Trace Sand & Gravel, Brown No Gravel After .5'
	2	1.5-2.5	12	SILT, Little Clay, Trace Sand, Brown.
	3	2.5-4.0	18	Some Gray Staining at 3.0' SAND & GRAVEL, Brown at 3.7'

185

Water at 22 inches

L-6	1	0.0-1.5		SILT, Little Clay, Trace Sand & Gravel, Brown
	2	1.5-2.5		SILT, Little Clay, Trace Sand & Gravel, Brown
	3	2.5-4.0		Dark Gray Staining at Bottom from 3.0', Sand & GRAVEL, Brown at 3.8'

Water at 23 inches

Composite Sample: Lagoon Area #4  
 Date: August 19, 1982  
 Water Sample: Yes

186

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-7	1	0.0-1.5	10	SILT, Little Clay, Brown
	2	1.5-2.5	6	SILT, Little Clay, Brown
	3	2.5-4.0	3	SILT, Little Clay, Brown
L-8	1	0.0-1.5	18	SILT, Little Clay, Brown
	2	1.5-2.5	12	Some Dark Gray Staining at 2.5'
	3	2.5-4.0	15	Cherty Gravel at 3.5'

Water at 27 inches

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Lagoon Area #5  
 Date: August 19, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-9	1	0.0-1.5	16	SILT, Little Clay, Brown
	2	1.5-2.5	10	SILT, Little Clay, Brown
	3	2.5-4.0	18	Light Dark Gray Staining at Bottom
L-10	1	0.0-1.5	14	SILT, Little Clay, Brown
	2	1.5-2.5	10	Dark Gray Staining at 2.0'
	3	2.5-4.0	18	Dark Gray Staining at 2.0'

Composite Sample: Lagoon Area #6  
 Date: August 19, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-11	1	0.0-1.5	6	SILT, Little Clay, Brown
	2	1.5-2.5	6	SILT, Little Clay, Brown
	3	2.5-4.0	18	SILT, Little Clay, Brown
L-12	1	0.0-1.5	5	SILT, Little Clay, Brown
	2	1.5-2.5	8	SILT, Little Clay, Brown
	3	2.5-4.0	18	SILT, Little Clay, Brown, Dark Brown Staining After 3.7'

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Lagoon Area #7  
 Date: August 19, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-13	1	0.0-1.5	14	SILT, Little Clay, Trace Sand, Brown
	2	1.5-2.5	10	SILT, Little Clay, Trace Sand, Brown
	3	2.5-4.0	18	Dark Gray Staining at Bottom 3.0 to 4.0'

Water at 25 inches

L-14	1	0.0-1.5	18	SILT, Little Clay, Brown
	2	1.5-2.5	10	SILT, Little Clay, Brown
	3	2.5-4.0	18	Some Dark Gray Staining 3.5 to 4.0'

Composite Sample: Lagoon Area #8  
 Date: August 19, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-15	1	0.0-1.5	10	SILT, Little Clay, Trace Sand, Brown
	2	1.5-2.5	10	SILT, Little Clay, Trace Sand, Brown
	3	2.5-4.0	10	SILT, Little Clay, Trace Sand, Brown
L-16	1	0.0-1.5	4	SILT, Little Clay, Trace Sand, Brown
	2	1.5-2.5	12	SILT, Little Clay, Trace Sand, Brown
	3	2.5-4.0	6	SILT, Little Clay, Trace Sand, Brown

## BORING LOG

Composite Sample: Lagoon Area #9  
 Date: August 20, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-17	1	0.0-1.5	12	SILT, Little Clay, Trace Sand, Brown, Hard
	2	1.5-2.5	8	SILT, Little Clay, Trace Sand, Brown, Hard
	3	2.5-4.0	18	SILT, Little Clay, Trace Sand, Brown, Slight Dark Gray Staining
L-18	1	0.0-1.5	15	SILT, Little Clay, Brown SILT, Little Clay, Trace Sand, Stained Dark Gray at 4"
	2	1.5-2.5	12	SILT, Little Clay, Trace Sand, Stained Dark Gray
	3	2.5-4.0	18	SILT, Little Clay, Trace Sand, Stained Dark Gray

Composite Sample: Lagoon Area #10  
 Date: August 20, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
L-19	1	0.0-1.5	6	SILT, Little Clay, Trace Sand & Gravel, Brown
	2	1.5-2.5	6	Some Chert Pieces
	3	2.5-4.0	18	Dark Gray Staining After 3.5'
L-20	1	0.0-1.5	0	SILT, Little Clay
	2	1.5-2.5	10	SILT, Little Clay, Trace Sand & Cherty Gravel, Brown
	3	2.5-4.0	18	SILT, Little Clay, Trace Sand & Cherty Gravel, Brown

## BORING LOG

Composite Sample: Lagoon Area #11  
 Date: August 20, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
73	L-21	1	0.0-1.5	18	SILT, Little Clay, Hard, Brown to SILTY SAND, Red Brown at 0.2', Dark Gray Staining at 1.0'
		2	1.5-2.5	10	SILTY SAND, Red Brown, Dark Gray Staining
		3	2.5-4.0	18	SILTY SAND, Red Brown, Dark Gray Staining
74	L-22	1	0.0-1.5	8	SILT, Little Clay, Brown
		2	1.5-2.5	16	SILT, Little Clay, Brown
		3	2.5-4.0	18	Dark Gray Staining at Bottom

Composite Sample: Lagoon Area #12  
 Date: August 20, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>	
74	L-23	1	0.0-1.5	10	SILT, Little Clay, Trace Gravel & Sand, Brown
		2	1.5-2.5	6	SILT, Little Clay, Trace Gravel & Sand, Brown
		3	2.5-4.0	12	SILT, Little Clay, Trace Gravel & Sand, Brown
75	L-24	1	0.0-1.5	10	SILT, Little Clay, Trace Gravel & Sand, Brown
		2	1.5-2.5	12	SILT, Little Clay, Trace Gravel & Sand, Brown
		3	2.5-4.0	12	SILT, Little Clay, Trace Gravel & Sand, Brown

## BORING LOG

Tetra Tech Consultants, Inc.

Composite Sample: Lagoon Area #13  
 Date: August 23, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
95	L-25	1	0.0-1.5	12	SILT, Little Clay, Trace to Little Gravel & Sand, Brown
		2	1.5-2.5	12	SILT, Little Clay, Trace to Little Gravel & Sand, Brown
		3	2.5-4.0	12	SILT, Little Clay, Trace to Little Gravel & Sand, Brown

	L-26	1	0.0-1.5	12	SILT, Little Clay, Trace to Little Sand & Gravel, Brown
		2	1.5-2.5	6	SILT, Little Clay, Trace to Little Sand & Gravel, Brown
		3	2.5-4.0	6	Gravel at 3.5'

Water at 26 inches

Composite Sample: Lagoon Area #14  
 Date: August 24, 1982  
 Water Sample: Yes

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
17*	L-27	1	0.0-1.5	10
		2	1.5-2.5	6
		3	2.5-4.0	SILT, Little Clay, Trace Sand & Gravel, Brown, Some Gray Staining
17	L-28	1	0.0-1.5	12
		2	1.5-2.5	SILT, Little Clay, Trace Sand & Gravel, Gray
		3	2.5-4.0	SAND & GRAVEL, Gray at 3.5'

\* note: There is no sample # 196

1. unlogged

## BORING LOG

Composite Sample: Lagoon Area #15  
 Date: August 30, 1982  
 Water Sample: Yes

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
198	L-29	1	0.0-1.5	10	SILT, Little Clay, Trace Sand & Gravel, Brown
		2	1.5-2.5	10	SILT, Little Clay, Trace Sand & Gravel, Brown
		3	2.5-4.0	14	SAND & GRAVEL at 3.8'
Water at 10 inches					
	L-30	1	0.0-1.5		SILT, Little Clay, Trace Sand & Gravel, Brown
		2	1.5-2.5		SILT, Little Clay, Trace Sand & Gravel, Brown
		3	2.5-4.0		SAND & GRAVEL, Brown at 3.9'
Water at 28 inches					

## BORING LOG

Composite Sample: Trench Perimeter #1  
 Date: August 25, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
199	TP-1	1	0-1.5	12	SILTY CLAY, Trace Sand with Pieces of Chert
		2	1.5-3.0	15	SILTY CLAY, Trace Sand with Pieces of Chert
		3	3.0-4.5	15	SILTY CLAY, Trace Sand with Pieces of Chert
		4	4.5-6.0	15	SILTY CLAY, Trace Sand with Pieces of Chert
		5	6.0-7.5	18	SILTY CLAY, Trace Sand with Pieces of Chert
		6	7.5-9.0	6	Large Amounts of Chert
		7	9.0-10.5	0	No Recovery, Block by Piece of Chert
		8	10.5-12.0	18	Mostly Chert with Few Clay Seams
		9	12.0-13.5	6	SILTY CLAY, Trace Sand with Pieces of Chert
		10	13.5-15.0	6	SILTY CLAY, Trace Sand with Pieces of Chert

## BORING LOG

Composite Sample: Trench Perimeter #3  
 Date: August 30, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

Sampling Procedure Change: Samples were obtained from auger flights

<u>Sample</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
201	TP-3	1	0-3		SILTY CLAY, Red Brown
		2	3-5.5		SILTY CLAY, Red Brown
		3	5.5-8.0		SILTY CLAY, Red Brown
		4	8.0-10.5		SILTY CLAY, Red Brown
		5	10.5-13.0		SILTY CLAY, Red Brown
		6	13.0-15.5		SILTY CLAY, Red Brown

Composite Sample: Trench Perimeter #4  
 Date: August 30, 1982  
 Water Sample: No

<u>Sample</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
02	TP-4	1	0-3		SILTY CLAY with Pieces of Chert, Red Brown
		2	3-5.5		SILTY CLAY with Pieces of Chert, Red Brown
		3	5.5-7.0		SILTY CLAY with Pieces of Chert, Red Brown

Auger advance blocked, probable cause is large piece of chert in silty clay soils.

## BORING LOG

Composite Sample: Trench Perimeter #5  
 Date: August 30, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
203	TP-5	1	0-3.0		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown
		2	3.0-5.5		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown
		3	5.5-8.0		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown
		4	8.0-10.5		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown
		5	10.5-12.5		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown
		6	12.5-15.0		SILTY CLAY, Trace Sand with Pieces of Chert, Red Brown

Composite Sample: Trench Perimeter #6  
 Date: August 31, 1982  
 Water Sample: No

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
204	TP-6	1	0-3.0		SILTY CLAY, Dark Brown changing to SILTY CLAY, Gray at 1 inch to SILTY CLAY, Red Brown at 12 inches. Pieces of Chert, Sand to Cobble size throughout soils.
		2	3.0-5.5		
		3	5.5-8.0		
		4	8.0-10.5		
		5	10.5-13.0		
		6	13.0-15.0		

## BORING LOG

Composite Sample: Trench Perimeter #7  
 Date: August 31, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

Sample #

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
205	TP-7	1	0-3.0	
		2	3.0-5.5	
		3	5.5-8.0	
		4	8.0-10.5	
		5	10.5-12.5	SILTY CLAY, Trace Sand, Gray changing to SILTY CLAY, Red Brown at 8 inches. Both soils contained pieces of chert ranging in size from sand to cobbles. Auger refusal at 12.5 feet, probable Limestone.

Composite Sample: Trench Perimeter #8  
 Date: August 31, 1982  
 Water Sample: No

Sample #

<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
206	TP-8	1	0-3.0	Mixture of SILTY CLAY, Gray and Gravel possible Fill changing to SILTY CLAY, Red Brown at 3'. Soils contained large amounts of chert pieces varying in size from sand to cobbles and boulders. Hole backfilled with Bentonite.
		2	3.0-5.5	
		3	5.5-8.0	
		4	8.0-10.5	
		5	10.5-12.0	
		6	12.0-15.0	

Water in boring hole filled with bentonite

## BORING LOG

Composite Sample: Trench Perimeter #9  
 Date: August 31, 1982  
 Water Sample: No

Verona Phase II  
 Job No. 282541  
 October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
207	TP-9	1	0-3.0		SILTY CLAY, Red Brown changing to mixture of SILTY CLAY, Red Brown and Dark Gray material at 4:0'
		2	3.0-5.5		changing to SANDY SILTY CLAY, Gray with Sand and Gravel at 7.0' changing to
		3	5.5-8.0		SILTY CLAY, Red Brown at
		4	8.0-10.5		10.0'. Strong Spoilage
		5	10.5-13.0		
		6	13.0-15.0		

Composite Sample: Trench Perimeter #10  
 Date: September 1, 1982  
 Water Sample: No

<u>Boring #</u>	<u>Sample</u>	<u>Depth</u> (ft)	<u>Recovery</u> (in)	<u>Description</u>
47	TP-10	1	0-3.0	SILTY CLAY FILL with Pieces of Chert, Red Brown changing to Gray FILL consisting of part of Drums, filter cake,
		2	3.0-5.5	SILTY CLAY, Plastic and others at 9.0'
		3	5.5-8.0	
		4	8.0-10.5	
		5	10.5-13.0	
		6	13.0-15.5	

## BORING LOG

Terracon Consultants, Inc.

Composite Sample: Irrigation Area  
Date: August 23, 1982  
Water Sample: No

Verona Phase II  
Job No. 282541  
October 20, 1982

<u>Sample #</u>	<u>Boring #</u>	<u>Sample</u>	<u>Depth (ft)</u>	<u>Recovery (in)</u>	<u>Description</u>
<b>Irrigation Area #1</b>					
001	1A	1 - 8	0 - 1		SILT, Little Clay, Trace Sand, Brown
<b>Irrigation Area #2</b>					
002	1A	9 - 16	0 - 1		SILT, Little Clay, Trace Sand, Brown
<b>Irrigation Area #3</b>					
003	1A	17 - 24	0 - 1		SILT, Little Clay, Trace Sand, Brown
<b>Irrigation Area #4</b>					
004	1A	25 - 32	0 - 1		SILT, Little Clay, Trace Sand, Brown
<b>Irrigation Area #5</b>					
005	1A	33 - 40	0 - 1		SILT, Little Clay, Trace Sand, Brown
<b>Irrigation Area #6</b>					
006	1A	41 - 48	0 - 1		SILT, Little Clay, Trace Sand, Brown

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4529 -- Trench Area Water Sample T9<sup>1</sup>

Compound	CAS #	Concentration (ppb <sup>d</sup> )	Fraction
2,4-dichlorophenol	122-83-2	1000	acid
phenol	108-95-2	760	"
benzoic acid*	65-85-0	LT	"
4-methylphenol*	108-39-4	96	"
2,4,5-trichlorophenol*	95-95-4	43.2 ppm	"
1,2-dichlorobenzene	95-50-1	LT	base-neutral
1,4-dichlorobenzene	106-46-7	60	" "
naphthalene	91-20-3	250	" "
fluorene	86-73-7	LT	" "
phenanthrene	85-01-8	78	" "
2-methylnaphthalene*	91-57-6	610	" "
methyl benzene**	108-88-3	170	ABN
butanoic acid**	107-92-6	42	"
hexanoic acid**	142-62-1	34	"
2 ethyl hexanoic acid**	149-57-5	290	"
2,3-dihydro-4-methyl-1H-indene**	824-22-6	41	"
4-chlorophenol**	106-48-9	130	"
hexadecane**	544-76-3	150	"
2 methyl naphthalene**	91-57-6	78	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4546 -- Trench Area Water Sample T16<sup>1</sup>

Compound	CAS #	Concentration (ppb)	Fraction
bis (2-ethylhexyl) phthalate	117-81-7	700	base-neutral

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4530 -- Trench Area Water Sample T17<sup>1</sup>

Compound	CAS #	Concentration (ppb)	Fraction
2,4,6-trichlorophenol	88-06-2	120	acid
2,4-dichlorophenol	122-83-2	410	"
phenol	108-95-2	1800	"
4-methylphenol*	108-39-4	1000	"
2,4,5-trichlorophenol*	95-95-4	5700	"
acenaphthene	83-32-9	LT	base-neutral
1,2,4-trichlorobenzene	120-82-1	380	" "
1,4-dichlorobenzene	106-46-7	290	" "
naphthalene	91-20-3	790	" "
bis (2-ethylhexyl) phthalate	117-81-7	160	" "
di-n-butyl phthalate	84-74-2	LT	" "
fluorene	86-73-7	110	" "
phenanthrene	85-01-8	260	" "
2-methylnaphthalene*	91-57-6	1600	" "
hexanoic acid**	142-62-1	9000	ABN
tetradecane**	629-59-4	1500	"
1,2,4-trichloro-3-methoxy benzene**	50375-10-5	7600	"
hexadecane**	544-76-3	3300	"
eicosane**	112-95-8	1600	"
1,8-dimethyl naphthalene**	569-41-5	1700	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AT4531 -- Trench Area Water Sample (No Number)<sup>1</sup>

Compound	CAS #	Concentration (ppb)	Fraction
2,6-bis (1,1-dimethylethyl)-H-methyl phenol**	128-37-0	520	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN38H -- Irrigation Area Composite Soil Sample G

Compound	CAS #	Concentration (ppb)	Fraction
naphthalene	91-20-3	1390	base-neutral
phenanthrene	85-01-8	780	" "
2-methylnaphthalene	91-57-6	3750	" "
methylene chloride	75-09-2	25	volatile
dodecane**	112-40-3	520	ABN
tridecane**	629-50-5	1200	"
tetradecane**	629-59-4	1600	"
1,8-dimethyl naphthalene**	569-41-5	1400	"
pentadecane**	629-62-9	2000	"
2,3,6-trimethyl naphthalene**	829-26-5	1200	"
hexadecane**	544-76-3	2100	"
heptadecane**	629-78-7	2100	"
octadecane**	593-45-3	1600	"
eicosane**	112-95-8	1500	"
pentadecane**	629-62-9	670	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN3816 -- Irrigation Area Soil Sample D

Compound	CAS #	Concentration (ppb)	Fraction
2,4,5-trichlorophenol**	95-95-4	200	ABN
4-methyl-2-propyl-1-pentanol**		400	"
hexatricontane**	630-06-8	400	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN38I -- Burn Area Composite Soil Sample E

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	250	volatile

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN3833 -- Burn Area Soil Sample C

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	45	volatile
1,2-benzenedicarboxylic acid **	88-99-3	860	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN38J -- Lagoon Area Composite Water Sample T<sup>1</sup>

Compound	CAS #	Concentration (ppb)	Fraction
1,4-dioxane**	123-91-1	144	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN38K -- Lagoon Area Composite Soil Sample U

Compound	CAS #	Concentration (ppb)	Fraction
2,4,5-trichlorophenol*	95-95-4	6920	acid
bis (2-ethylhexyl) phthalate	117-81-7	1730	base-neutral
methylene chloride	75-09-2	23.9	volatile
hexane**	110-54-3	6.5	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN38L -- Lagoon Area Composite Soil Sample V

Compound	CAS #	Concentration (ppb <sup>0</sup> )	Fraction
2,4,6-trichlorophenol	88-06-2	134 ppm	acid
2,4-dichlorophenol	122-83-2	830	"
2,4,5-trichlorophenol*	95-95-4	244 ppm	"
1,2,4-trichlorobenzene	120-82-1	46.4 ppm	base-neutral
1,2-dichlorobenzene	95-50-1	590	" "
1,4-dichlorobenzene	106-46-7	1170	" "
naphthalene	91-20-3	490	" "
bis (2-ethylhexyl) phthalate	117-81-7	1340	" "
2-methylnaphthalene*	91-57-6	LT	" "
chlorobenzene	108-90-7	10.5	volatile
ethylbenzene	100-41-4	6.8	"
methylene chloride	75-09-2	790	"
toluene	108-88-3	1220	"
acetone*	67-64-1	550	"
0-xylene*	95-47-6	39	"
2-methyl-1,3-dioxolane**	497-26-7	2.9	"
4-methyl-2-pentanone**	108-10-1	4.8	"
2,2-dimethyl-3-methylene- bicyclo/2.2.1/heptane**	79-92-5	120	"
1,7,7-trimethyl-bicyclo/2.2.1/ heptan-2-one**	76-22-2	16	"
1,3-dimethyl benzene**	108-38-3	220	"
2,2,5,5-tetramethyl-(Z)-3- hexene**	692-47-7	12	"
decane**	124-18-5	2200	ABN
undecane**	1120-21-4	3700	"
1,2,3,5-tetrachlorobenzene**	634-90-2	5300	"
1,2,4-trichloro-3-methoxy- benzene**	50375-10-5	340	"
1,2-dimethyl-4-(phenylmethyl) benzene**	13540-56-2	990	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN38M -- Lagoon Area Composite Soil Sample W

Compound	CAS #	Concentration (ppb)	Fraction
methylene chloride	75-09-2	230	volatile

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN3820 -- Lagoon Area Soil Sample D

Compound	CAS #	Concentration (ppb)	Fraction
bis (2-ethylhexyl) phthalate	117-81-7	100 (M)	base-neutral
2,4,5-trichlorophenol**	95-95-4	1400	ABN
hexadecanoic acid**	57-10-3	400	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN3821 -- Lagoon Area Soil Sample E

Compound	CAS #	Concentration (ppb)	Fraction
1,3,5-cycloheptatriene**	544-25-2	570	ABN
hexadecanoic acid**	57-10-3	590	"

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AN3835 -- Lagoon Area Water Sample P

Compound	CAS #	Concentration (ppb)	Fraction
diiodomethane**	75-11-6	79	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

**AN3822 -- Lagoon Area Water Sample F**

Compound	CAS #	Concentration (ppb)	Fraction
diiodomethane**	75-11-6	79	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AN3841 -- Lagoon Area Soil Sample R

Compound	CAS #	Concentration (ppb)	Fraction
4,6-dinitro-2-methylphenol	534-52-1	LT	acid
di-n-butyl phthalate	184-74-2	LT	base-neutral
methylene chloride	75-09-2	16	volatile
PCB-1254	11097-69-7	297	pesticide
PCB-1248	12672-29-6	236	"
benzoic acid**	65-85-0	1000	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

5

AQ3405 -- Adjoining Area Soil Sample

Compound	CAS #	Concentration (ppb)	Fraction
trichlorophenol**	---	340	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AQ3406 -- Adjoining Area Sediment Sample

Compound	CAS #	Concentration (ppb <sup>®</sup> )	Fraction
tetrachlorobenzene*	---	300	ABN
trichlorophenol**	---	250	"
hexadecanoic acid*	57-10-3	1000	"
sulfur (S8)*	7704-34-9	6000	---
hexachlorophene**	70-30-4	51 ppm	ABN
hexachlorophene isomer**	---	3400	"

PRIORITY AND NON-PRIORITY POLLUTANTS

SYNTEX AREA

VERONA, MISSOURI

April, 1984

AQ3407 -- Adjoining Area Sediment Sample

Compound	CAS #	Concentration (ppb <sup>0</sup> )	Fraction
trichlorophenol**	---	360	ABN
hexadecanoic acid*	57-10-3	2000	"
sulfur (S8)*	7704-34-9	8000	---
hexachlorophene**	70-30-4	22 ppm	ABN

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

AQ3408 -- Adjoining Area Sediment Sample

Compound	CAS #	Concentration (ppb)	Fraction
trichlorophenol **	---	71	ABN
sulfur (S8) *	7704-34-9	3000	---

PRIORITY AND NON-PRIORITY POLLUTANTS

**SYNTEX AREA**

VERONA, MISSOURI

April, 1984

None Detected

AT4527 -- Trench Area Water Sample T7

AT4542 -- Trench Area Soil Sample P11

AN3842 -- Lagoon Area Water Samples S

AQ3404 -- Adjoining Area Soil Sample

NOT SHOWN ON MAP

Analytical Report Sheets Not Available

AT4525 -- Trench Area Sample T5 (Water)

AT3819 -- Lagoon Area Soil Sample B

No Number

AT4531 -- Trench Area Sample?